### FINDING OF NO SIGNIFICANT IMPACT

#### AND

#### **DECISION RECORD**

Office: BLM, Upper Snake River District and Lower Snake River District

EA Number: ID-070-00-053 (USRD) ID-010-00-053 (LSRD)

EA Name: Strategies for Grasshopper/Mormon Cricket Control in Southern Idaho

## Finding of No Significant Impact:

Based on the analysis of potential environmental impacts contained in the environmental assessment (EA) referenced above, I have determined that impacts are not expected to be significant, and an environmental impact statement is not required.

### **Decision:**

My decision is to allow selective application of chemicals and biological agents on public lands for the control of grasshoppers and Mormon crickets, when economical infestations occur next to private cropland. Site-specific proposals for chemical applications will be processed at the Field Office organizational level, and the appropriate BLM Field Manager will be the authorizing official for each such proposal. BLM will request the Animal Plant Health Inspection Service (APHIS) to conduct the treatment applications for a crop protection program involving public lands in accordance with the following criteria, conditions, and measures:

# **Standard Operating Procedures:**

- 1. Only those chemicals approved by EPA for the control of grasshoppers and Mormon crickets will be authorized for application on public lands.
- 2. Chemical treatments will be allowed only when grasshopper infestations are of economic concern (8 or more per square yard).
- 3. A five hundred foot buffer zone will be maintained around all crops for which the insecticide being applied is not registered.

- 4. Chemical treatments will be applied by a licensed commercial applicator and in accordance with label directions.
- 5. Chemical treatments will not be applied on municipal watersheds unless specifically requested in writing by the local governing bodies.
- 6. Chemical treatments will not be applied directly to any water body or on humans, residences, livestock, permitted apiaries, or automobiles.
- 7. Chemical treatments will not be applied in areas where biological control agents have been released to control noxious weeds, and a buffer of 300 feet will be maintained around these areas.
- 8. Chemical treatment will not be applied within drainages occupied by bull trout (Little Lost River watershed, Jack Creek, and Dave Creek in the South Fork of the Boise River drainage above Anderson Ranch Dam, and in tributaries of the Snake River, Indian Creek, and Wildhorse River).
- 9. The authorizing Field Manager will review each request for control to determine if additional environmental protective and mitigation measures are needed, taking into consideration the species-specific, area-specific, and general recommendations presented in the referenced EA (see Table 1 on page 22, Table 2 on page 27, and the Protective and Mitigation Measures on page 29 of the EA).
- 10. Monitoring by APHIS will include documentation of what, where, and how grasshopper control is implemented. Documentation will include the request form filled out by the BLM office implementing the control activities. Impacts to non-target species will be documented as part of the monitoring process.

### **Application Guidelines:**

- 1. Dimilin will be used in a proactive, preventive mode by approving early application to known or suspected high infestation areas. The area treated will be generally ½ mile from crop edge using strip application technique (RAATs). Treatments up to 1 mile may be authorized on areas shown in the table below. Treated areas cannot be retreated (with the same or another chemical) for 28 days. It is the intent to emphasize the use of Dimilin and carbaryl bait wherever possible to minimize impacts to non-targets species. Use of carbaryl spray is preferred over malathion spray wherever possible.
- 2. Any chemical treatments for grasshopper and Mormon cricket control will be applied in accordance with the guidelines presented in the following table. For the purposes of this table, "grassland" refers to areas dominated by grass or forbs, and "sagebrush areas" refers to areas that have been identified as sage grouse key habitat areas as shown on the Sage Grouse

Habitat Map developed jointly by IDF&G and BLM as a resource planning aid. There are two maps for the area covered in this ROD and EA, one for Idaho Falls and Pocatello Field Offices; and, the second for Burley, Shoshone, and Jarbridge Field Offices. (Maps are available for inspection at these offices). Areas outside of these key habitats will be defined and evaluated for sagebrush presence; percent canopy cover; diversity of understory vegetation and height classes; and the use of these areas by sagebrush obligate species, sage grouse broods and other sensitive species. A determination will be made at that time as to treatment method or mitigation measures. This will be documented on the Project Approval Form before the Field Manager signs it.

Chemical	Treatment Area Characteristics	Proposed Treatment
Dimilin 2L <sup>1</sup> applied at rate of 1 ounce active ingredient (a.i.) per acre	Grassland	Generally limited to ½ mile strip but may be used up to 1 mile from crop edge  Use RAATs methodology
		CSC 10 II 113 memodology
	Sagebrush areas	Limited to strip up to ½ mile from crop edge
		Use RAATs methodology
Carbaryl bait 5% (0.5 pounds a.i.) - applied at rate of less than 10 pounds treated bait per acre	Grassland	Generally limited to ½ mile strip but may be used up to 1 mile where Dimilin 2L treatments were ineffective or not used and/or within the 500 foot setback from crops.  Use RAATs methodology
	Sagebrush areas	May be used up to ½ mile from crop edge where Dimilin 2L treatments were ineffective, inappropriate, or not used, and/or within the 500 foot setback from crops. Beyond 500 feet, application will not be made until on, or after July 15.  Use RAATs methodology

Chemical	Treatment Area Characteristics	Proposed Treatment
Carbaryl spray applied at rate of 0.5 pounds a.i. per acre	Grassland	Generally limited to ½ mile strip but may be used up to 1 mile where Dimilin 2L treatments were ineffective, inappropriate, or not used, and/or within the 500 foot setback from crops.  Use RAATs methodology
	Sagebrush areas	No treatment
Malathion applied at rate of 0.58 pounds (8 ounces) a.i. per acre	Grasslands	Generally limited to ½ mile strip but may be used up to 1 mile where Dimilin 2L and carbaryl treatments were ineffective or inappropriate and/or within the 500 foot setback from crops.  Use RAATs methodology
	Sagebrush areas	No treatment

<sup>&</sup>lt;sup>1</sup> Unless Dimilin is approved for the crop, a 500 foot setback will be used.

### **Rationale for Decision:**

This decision is in conformance with all applicable BLM land use plans. It implements the proposed action analyzed in the Environmental Assessment for the Control of Grasshoppers on Public Lands in Idaho prepared by BLM in March 2000. All reasonable mitigating measures have been adopted to ensure that environmental impacts will be reduced to acceptable levels. The decision is supported in part by the USDA-APHIS Rangeland Grasshopper Cooperative Management Program Environmental Impact Statement of April 1987. The use of Dimilin 2L is supported by the Chemical Risk Assessment for Diflubenzuron Use in Grasshopper Cooperative Control Program prepared by APHIS in March 2000, BLM's environmental assessment, and the chemical label.

This decision provides for crop protection and minimizes risks to fish, wildlife, and plants of

concern, and other non-target species. It emphasizes the use of Dimilin 2L, which does not kill all species of insects, and its effects on terrestrial and aquatic species are many times less toxic than malathion or carbaryl.

Treatment of grasshopper and Mormon cricket infestations on public lands will help reduce this year's economic losses to the private sector, may reduce grasshopper populations and economic losses in subsequent years, and may slightly reduce grasshopper damage to vegetation on public lands. Restricting spraying in sharp-tailed grouse or sage grouse brood-rearing habitat, and giving preference to the use of Dimilin 2L or carbaryl bait in such habitat, will reduce the level of potential impacts to these two sensitive species and will also reduce impacts to other sagebrush-dependent species. The ability of carbaryl bait to fall through the layers of vegetation and be deposited on the ground improves the effectiveness of this treatment strategy. Also, carbaryl bait has environmental advantages over liquid sprays: 1) It presents little or no potential for chemical exposure by direct contact with nontarget organisms, 2) It is eaten only by certain arthropods and does not directly affect many beneficial species, 3) The amount of active insecticide applied per unit area is lower than liquid sprays, and 4) Indirect effects on nontarget species may be reduced because fewer types of arthropods are affected.

The proposed action provides for a balanced approach that will allow treatments on public lands to reduce grasshopper/Mormon cricket damage on adjacent cropland, while avoiding adverse effects to special status species and other environmental values.

# **Monitoring:**

Monitoring associated with grasshopper control is done mostly out of concern for effects on nontarget plants and animals. APHIS in cooperation with BLM will determine monitoring plans for site-specific control actions, based upon the specific control measures initiated. These plans will include:

- 1. Indications of cumulative impacts associated with the use of other pesticides.
- 2. Possible synergistic effects associated with the use of other pesticides.
- 3. The effectiveness of the control action on target grasshoppers and Mormon crickets, and effects on the environment. The effects on nontarget plants and animals should be included in any monitoring reports.

### **Approvals**:

/s/ Jim May District Manager, USRD /s/ Kate Kitchell District Manager, LSRD April 14, 2000 Date